

AMENDMENTS TO THE SPECIFICATION:

Please replace the paragraph beginning at page 2, line 26, with the following amended paragraph:

These ~~object~~ objects, as well as other objects that will be apparent from the description below, have now been obtained according to the present invention by providing a new Co-based powder metal composition. Critical features of this composition are that the composition comprises a Co-based pre-alloyed powder with irregularly shaped particles admixed with graphite. Furthermore, the Co-based pre-alloyed powder should include less than 0.3% by weight of carbon and at least 15% by weight Cr. The Co-based pre-alloyed powder preferably comprises at least 30% by weight and preferably less than 80% by weight Co.

Please replace the paragraph beginning at page 1, line 30, with the following amended paragraph:

Attempts have been made over the years to produce cobalt-based products using the PM technology. Thus the U.S. Pat. No. 4,129,444 discloses a process wherein atomised Co-based alloy powders are coated with a binder and then consolidated to produce discrete bodies that are dried, crushed and screened to obtain agglomerates. The agglomerates are pressed into green compacts which are sintered at high temperature. Furthermore the U.S. Pat. No. ~~5,462,572~~ 5,462,575 discloses a powder metallurgy component prepared of a gas atomised Co--Cr--Mo alloy powder. The alloy powder is filled in a canister and baked in vacuum to degas the powder and the powder filled canister is thereafter consolidated, preferably by hot isostatic pressing (HIP).

Please replace the paragraph beginning at page 3, line 27, with the following amended paragraph:

A preferred pre-alloyed powder according to the invention ~~comprise~~ comprises: ~~5-35%~~ 15-35% by weight Cr, 0-20% by weight W, 0-25% by weight Ni, 0-5% by weight Si, 0-5% by weight Fe, 0-10% by weight Mo, balance Co and less than 0.3% by weight C.

Please replace the paragraph beginning at page 4, line 6, with the following amended paragraph:

The powder metal composition may further comprise one ~~ore~~ or more additives selected from the group consisting of alloying elements, lubricants, processing aids and binders.

Please replace the paragraph beginning at page 5, line 3, with the following amended paragraph:

The following example, which is not intended to be limiting, ~~present~~ presents certain embodiments of the present invention.

Please replace the paragraph beginning at page 5, line 8, with the following amended paragraph:

The test mixtures (mix 1-5) listed in ~~table~~ Tables 2 and 3 were prepared from the water atomised pre-alloyed powders in ~~table~~ Table 1 (% by weight).

Please replace the paragraph beginning at page 5, line 18, with the following amended paragraph:

The resulting components were tested for green density (GD) and green strength (GS). After sintering at 1120°C. for 30 minutes in a 90% N₂/10% H₂ atmosphere the components were tested for sintered density (SD) and hardness (Hv10). ~~Table~~ Tables 4 and 5 ~~discloses~~ disclose the results of the tests.

Please replace the paragraph beginning at page 7, line 14, with the following amended paragraph:

Compaction of mix 1, 3 and 4, without C in the pre-alloyed powder, showed a great improvement of the compressibility, as can be seen in ~~table~~ Tables 4 and 5, and high green strengths and green densities were achieved for the resulting components. Components with thin walls normally require a green strength of at least 7 MPa to enable handling. Green strengths above 20 MPa normally enable green machining.

Please replace the paragraph beginning at page 8, line 3, with the following amended paragraph:

A comparison between mix 3 and mix 4 in ~~table~~ Table 5 demonstrates the influence of lubricants on the green strength and green density of the compacted components. Kenolube™ gives a higher density than the mix of ~~Polyethyleneoxide~~ polyethyleneoxide and Orgasol which enables better performance in the sintered state.